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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/505,212	05/26/2005	Wolfgang Graf	785.44159X00	5154
20457 7590 01/04/2007 ANTONELLI, TERRY, STOUT & KRAUS, LLP 1300 NORTH SEVENTEENTH STREET SUITE 1800 ARLINGTON, VA 22209-3873			EXAMINER BEN, LOHA	
			ART UNIT	PAPER NUMBER
			2873	
SHORTENED STATUTORY PERIOD OF RESPONSE		MAIL DATE	DELIVERY MODE	
3 MONTHS		01/04/2007	PAPER	

**Please find below and/or attached an Office communication concerning this application or proceeding.**

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

**Office Action Summary**

Application No.

10/505,212

Applicant(s)

GRAF ET AL.

Examiner

Loha Ben

Art Unit

2873

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 20 August 2004.  
2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.  
3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-35 is/are pending in the application.  
4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.  
5) ☒ Claim(s) 1-3, 5, 25-27, 31, 32 and 35 is/are allowed.  
6) ☒ Claim(s) 4, 6-24, 28-30, 33 and 34 is/are rejected.  
7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.  
8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.  
10) ☒ The drawing(s) filed on 20 August 2004 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).  
11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
a) ☒ All b) ☐ Some \* c) ☐ None of:  
1. ☒ Certified copies of the priority documents have been received.  
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)  
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)  
3) ☒ Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date 0804:1104.  
4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.  
5) ☐ Notice of Informal Patent Application  
6) ☐ Other: \_\_\_\_\_.

## DETAILED ACTION

### *Specification*

The disclosure is objected to because of the following informalities:

Page 18: on line 1, "Fig. 1a to d" should be replaced with – Figs. 1a to 1d --; on line 6, "Fig. 3 a-e" should be replaced with – Figs. 3a-3e --; and on line 7, "Fig. 4 a, b, c" should be replaced with – Figs. 4a-4c --.

Page 21: in **third full** paragraph, on line 1, "Fig." should be replaced with – Figs. --, and on line 3, "Fig. 1a-d" should be replaced with – Figs. 1a-1d --.

Page 22: on lines 1 and 2 **from the bottom**, "Fig. 4a and b" should be replaced with – Figs. 4a and 4b --.

Appropriate correction is required.

Claims 6, 7, 10, 20, 26-28, 31 and 32 are objected to because of the following informalities:

In claim 6, on last line, after "side", -- . --(period) should be inserted; in claim 7, on line 2, "has" should be – having --; in claim 10, on line 1, before "8", ",", should be replaced with – or --; in claim 20, on line 2, "a" should be – the --; in claim 26, on line 2, after "that", "at least" should be replaced with – the at least one --; in claims 27 and 28, on line 2, before "partially", -- at least one – should be inserted; in claim 31, on line 2, after "least", -- one – should be inserted; and in claim 32, on line 1, "21" should be – 31 -  
-.

Appropriate correction is required.

***Claim Rejections - 35 USC § 112***

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 4, 6-24, 28-30, 33 and 34 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

In claim 4: bottom line, "the microstructures" has no antecedent basis.

Claims 6-8, depending from claim 4, inherit the indefiniteness thereof.

In claims 9-11, and 19: on line 2, "the optically switchable **layer**" has no antecedent basis. For claim 10 particularly, which depends from either claim 1 or 8, it is noted that claim 1 does not have "switchable layer", but it does have – switchable coating --.

In claim 9: on line 3, "the surface structure" has no antecedent basis.

In claim 12, on lines 2 and 3; and in claims 13, 20 and 21, on lines 1 and 2, "the optically switchable layer" has no antecedent basis.

Claim 14, depending from claim 11, inherits the indefiniteness thereof. Further, on line 2 from the bottom of the claim, the phrase "such as" renders the claim indefinite. See Ex parte Hall, 83 USPQ 38 (Bd. App. 1948).

Claims 15 and 18 are indefinite for calling for **a range within a range** associated with layer thickness. The definiteness of the claims is important to allow others who wish to enter the market place to ascertain the boundaries of protection that are provided by the claims. See Ex parte Kristensen, 10 USPQ 2d 1701, 1703 (PTO Bd. App. & Intf. 1989).

Claim 16, depending from claim 11, inherits the indefiniteness thereof.

Claim 17, depending from claim 16, inherits the indefiniteness thereof.

Claim 22, depending from claim 19, inherits the indefiniteness thereof.

In claim 23: on line 2, the phrase "such as" renders the claim indefinite.

In claim 24: on line 2 from the bottom, the phrase "such as" renders the claim indefinite.

In claim 28: on line 4, "the optically switchable layer" has no antecedent basis.

In claim 29, on line 5, and in claim 33, on lines 4 and 5, "the optically switchable layer" has no antecedent basis.

In claim 28: on line 5, and in claim 29, on lines 6 and 7, "the optically active layer" has no antecedent basis.

In claim 29: on line 5, "the microstructure surfaces" has no antecedent basis.

Claim 30, depending from claim 29, inherits the indefiniteness thereof.

Claim 34, depending from claim 33, inherits the indefiniteness thereof.

#### **Allowable Subject Matter**

Claims 1-3, 5, 25-27, 31, 32 and 35 are allowable.

Claim 4 would be allowable if rewritten or amended to overcome the rejection(s) under 35 U.S.C. 112, 2nd paragraph, set forth in this Office action.

Claims 9-15, 18-21, 23, 24, 28, 29 and 33 would be allowable if rewritten to overcome the rejection(s) under 35 U.S.C. 112, 2nd paragraph, set forth in this Office action and to include all of the limitations of the base claim and any intervening claims.

#### **Communication**

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Loha Ben whose telephone number is (571) 272-2323. The examiner can normally be reached on M-SAT, generally between 12:00 noon to 8:00 p.m.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Ricky Mack, can be reached on M-F, at (571) 272-2333. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

December 21, 2006



**Loha Ben**  
**Primary Examiner**